

Activity Handout 9.2

Which Stage Is It?

Read through each of the statements and then determine at what stage of cognitive development the person is in.

1. You take an infant's toy and place it behind the couch. The infant starts crying because he thinks it is gone.
STAGE:

2. There are two glasses of milk sitting on the table. One is a tall, thin glass and the other is a short, fat glass; both have the same amount of milk in them. When given a choice, Tommy takes the tall, thin glass.
STAGE:

3. You have two piles of coins. One pile has a dime and the other pile has 10 pennies. Susie chooses the pile with the 10 pennies because she thinks it has more money.
STAGE:

4. You ask the children in kindergarten to look at the problem on the board and explain what the completed answer would be. The problem is: $2 + 2 = 4$ and $4 - \underline{\quad} = \underline{\quad}$.
STAGE:

5. Stephanie is sitting at the end of a table and is looking at a picture of the sun above the mountains. Kelley is sitting half way down the side of the table and she sees in the picture the sun to the right of the mountains. Stephanie says that her answer of the sun sitting above the mountains is correct and doesn't see how Kelley's answer could be right.
STAGE:

6. Seth and Tim are in class and are asked to explain how to solve the problem of getting from one house to another that is across town when they only have 15 minutes to get there. Seth and Tim think about it and discuss the streets in town and the traffic situation at various times throughout the day. They come up with an answer without actually having to drive both distances to see which one is faster.
STAGE:

Piaget's Stages of Cognitive Development

Sensory-Motor - Birth to 2 years

Learn about the world through their senses and motor activities

Develops a sense of **self-recognition**- the ability to name them in the mirror

Develops **object permanence** - the realization that objects continue to exist even though they are not presently sensed. The development is gradual and continues throughout the period, so that in the later stages they not only realize that objects continue to exist, but actively search for vanished objects. They begin to experiment actively with things to discover how various actions affect an object or outcome. This is the most important task of children during this period because it helps them to understand concepts as time, space, and causality, and to realize they are separate from objects and from other people.

Preoperational 2-7 years

Use **symbols** to represent the external world

Language is used to stand for objects

Characterized by **animistic thinking** - the belief that inanimate objects, especially those that move or appear to move, are alive, are conscious, and have feelings

Their thinking is characterized by **egocentric thinking** - viewing situations only from their own perspective. They cannot distinguish between themselves and the outside world. They cannot put themselves in someone's place.

Their thinking is characterized by **irreversibility** - the inability to mentally retrace their steps in order to reach a conclusion

Their thinking is characterized by **centration** - focusing on only one attribute, or dimension, at a time

Concrete Operations 7-11 years

They can view things from perspectives other than their own

During this period they achieve **reversibility**, the ability to understand that their actions affect objects. If reversed in sequence they understand that objects will return to their original state.

During this period they achieve **decentration**, the ability to comprehend more than one aspect of a problem at a time

They achieve **conservation**, the principal that attributes such as mass weight, volume remain unchanged regardless of changes in the external appearance of an object

Their thinking is **logical but concrete**. They can only think in terms of concrete things they can handle or imagine. They can classify things and understand mathematical concepts, provided they are applied to concrete objects or events

Formal Operations 11years to adulthood

Can **formulate hypotheses**, accepting and rejecting them by testing them against available facts

They can manipulate, understand, and reason in **abstract** terms

They can reflect on their own feelings, attitudes, and actions. They can think about what others think about them

They can apply **logical** rules to situations that violate principles of reality

They can think and reason as an adult

PSYC 2301: LEARNING EXERCISE

Piaget's Theory of Cognitive Development

On notebook paper, fill in the blank with the correct term. There is a total of 30 answers.

1. When asked why the stars twinkle, Sarah replied, "Because they are happy." According to Piaget, Sarah's thinking is _____, and she is in the _____ stage of cognitive development.
2. Angelina views water poured from a glass of regular shape into one of an irregular shape and a different diameter. Because she has just seen the water poured into the second glass and can imagine the reverse of pouring water from the second glass back into the first glass, Angelina is certain that the amount of water in the two glasses is the same—even though the water levels in the two glasses are quite different. Angelina is demonstrating the principle of _____ and is in the _____ stage of cognitive development.
3. Three-month-old Georgia shakes her rattle because she loves to hear it, but when the rattle slips under the covers, it's "out of sight, out of mind." She doesn't search for it and she doesn't cry because it's gone. According to Piaget, Georgia is in the _____ stage of cognitive development.
4. Peter can debate the relative merits of nuclear and non-nuclear energy for generating electricity. According to Piaget, Peter is probably in the _____ stage of cognitive development.
5. Johnny continues to search for his ball after it has rolled out of sight; however, he is sure that all four-footed animals are dogs, regardless of whether they bark or meow. According to Piaget, Johnny has probably reached the _____ stage of cognitive development.
6. Paul has begun to use representational thought. He is aware that he has a sister, but it would never occur to him that his sister has a brother and that he is that brother. His mother can still "trick" him into drinking more milk by pouring it into a smaller cup, and telling him he has less to drink, so "Drink up!" Even if Paul saw her pour the milk into the smaller cup, her "trick" would still work because, according to Piaget, Paul is at the _____ stage of development and cannot yet mentally retrace his steps in thinking, i.e., his thinking is still characterized by _____.
7. The fact that Jerome realizes that the mass of a ball of clay is the same, no matter what its shape, indicates that he has achieved at least the _____ Piagetian stage of cognitive development and is able to comprehend more than one aspect of a problem at a time, i.e., he has achieved _____.
8. According to Piaget, which stage of cognitive development is characterized by coordination of sensory information and motor activity and the lack of the use of symbols to represent the external world?
9. Piaget believed that children can first think hypothetically in the _____ stage of cognitive development.
10. Susan and David seem to be unable to understand how anyone can perceive anything differently than they do. Also they believe the amounts of water in two beakers of different diameters are equal if the water is at the same level in the two beakers. According to Piaget, Susan and David are in the _____ stage of cognitive development. Their inability to handle the conservation problem is related to thinking that is characterized by _____, i.e., a focusing on only one attribute, or dimension, at a time.
11. Sharon would prefer a long piece of licorice compared to the same amount cut into smaller pieces because she cannot yet understand the concept of conservation. Sharon also believes that the sun and moon are alive because when she walks, they seem to follow her. According to Piaget, Sharon probably is at the _____ stage of cognitive development.

12. Patsy sees some candy and attempts to grab it. You put the candy in a drawer that is within her reach, but she acts as if she doesn't know it is there, and makes no move to open the drawer. Based upon this behavior, according to Piaget, Patsy is in the _____ stage of cognitive development.
13. Mary knows that pouring a liquid into a different shaped container does not change the amount of liquid. Also, she can reason logically, but she cannot handle abstractions, i.e., proverbs. According to Piaget, Mary has probably achieved the _____ stage of cognitive development.
14. If Eugene believes that water is "strong" and that it wants objects to float, he is demonstrating _____ thinking, and is probably in the _____ Piagetian stage of cognitive development.
15. Dee Dee enjoys playing the game of hide-and-seek. The fact that she enjoys playing the game suggests that she remembers the vanished person and therefore has probably developed the concept of _____.
16. In Piagetian theory, the fact that a child believes that others see their world exactly as the child does is called _____. Such a child is in Piaget's _____ period of cognitive development.
17. Exactly half of the sugar is poured from a long, narrow bag into a round bowl. Gene says that the bowl contains less sugar than the bag because the sugar is "less tall." His sister Jeanette, who is a year or so older, explains to him that they both contain the same amount of sugar. Gene, in determining the amount of sugar, is focusing on only the height of the sugar, whereas Jeanette is taking into consideration both the height of the sugar and the shape and diameter of the two containers. Quite clearly, Gene's thinking is still characterized by _____, while Jeanette's is characterized by _____. Jeanette has developed the concept of _____, whereas Gene has not. According to Piaget, Jeanette has achieved at least the _____ stage of cognitive development.
18. What stage of cognitive development must children reach before they are able to think and reason more or less as adults?
19. Cynthia knows that she has the same amount of play dough whether she makes it into a ball or a snake. Cynthia has only recently achieved this concept and is entering the _____ Piagetian stage of cognitive development.
20. Rohini tells you that she once thought that the dishwasher hated her and wanted to eat her. In fact, she said that she felt that the machine was alive. At the time, Rohini was a normal four-year-old and was not mentally disturbed. According to Piaget, Rohini, at that time was probably in which stage of cognitive development?

Handout 9.5a

Piagetian Stages

Instructions: Identify the stage of cognitive development of the person described in each vignette. Please explain your answer, using Piagetian and other cognitive developmental principles from this chapter.

Johnny and his friends become lost in a very large city park while playing in the woods there. After overcoming an initial panic reaction, they figure out that they can find the way out by "backtracking" and using the landmarks that they saw on their way in to the woods. They do so and emerge from the woods 10 minutes later.

Hannah sees her mama pick up a shiny, sharp and utterly fascinating object from the kitchen floor and put it out of her reach on the counter. When mama leaves the room, Hannah sees a chair at the table 4 feet from the counter, looks again at the counter, and then begins to drag the chair slowly from the table to the counter. She is climbing up on the chair just as her mother returns to the kitchen.

Jermaine is asked the meaning of the saying "A bird in the hand is worth two in the bush." He says that sometimes it is not a good idea to let go of what you have for something that seems better because you could end up with nothing.

Jasmine is asked whether she has a sister. She says yes. She is asked whether her sister has a sister. She says no.

The babysitter can keep Maurice entertained for an hour with the game of peek-a-boo.

Susie is crying. She sees that her mother gave her big brother four fish sticks while she was given only two. She says, "He has more than me. That's not fair!" Her mother picks up the plate and cuts Susie's fish sticks in half. She puts them in front of the delighted Susie, who starts to eat them without complaint.

If you ask Dora who the tallest, smartest, or funniest person in her class is, she will answer the question fairly accurately.

Sarah is at a sleepover party where some of her friends are smoking cigarettes. They suggest that she try smoking to help keep her weight down. She imagines the possibility that that would work. She also imagines being 50 and having lung cancer. She declines the invitation.

Table 9.4

Erik Erikson's Psychosocial Stages of Development

Life Stage	Psychosocial Conflict	Positive Resolution	Negative Resolution
Infancy (birth to 18 months)	Trust vs. mistrust	Reliance on consistent and warm caregivers produces a sense of predictability and trust in the environment.	Physical and psychological neglect by caregivers leads to fear, anxiety, and mistrust of the environment.
Toddlerhood (18 months to 3 years)	Autonomy vs. doubt	Caregivers encourage independence and self-sufficiency, promoting positive self-esteem.	Overly restrictive caregiving leads to self-doubt in abilities and low self-esteem.
Early childhood (3 to 6 years)	Initiative vs. guilt	The child learns to initiate activities and develops a sense of social responsibility concerning the rights of others; promotes self-confidence.	Parental overcontrol stifles the child's spontaneity, sense of purpose, and social learning; promotes guilt and fear of punishment.
Middle and late childhood (6 to 12 years)	Industry vs. inferiority	Through experiences with parents and "keeping up" with peers, the child develops a sense of pride and competence in schoolwork and home and social activities.	Negative experiences with parents or failure to "keep up" with peers leads to pervasive feelings of inferiority and inadequacy.
Adolescence	Identity vs. identity diffusion	Through experimentation with different roles, the adolescent develops an integrated and stable self-definition; forms commitments to future adult roles.	An apathetic adolescent or one who experiences pressures and demands from others may feel confusion about his or her identity and role in society.
Young adulthood	Intimacy vs. isolation	By establishing lasting and meaningful relationships, the young adult develops a sense of connectedness and intimacy with others.	Because of fear of rejection or excessive self-preoccupation, the young adult is unable to form close, meaningful relationships and becomes psychologically isolated.
Middle adulthood	Generativity vs. stagnation	Through child rearing, caring for others, productive work, and community involvement, the adult expresses unselfish concern for the welfare of the next generation.	Self-indulgence, self-absorption, and a preoccupation with one's own needs lead to a sense of stagnation, boredom, and a lack of meaningful accomplishments.
Late adulthood	Ego-integrity vs. despair	In reviewing his or her life, the older adult experiences a strong sense of self-acceptance and meaningfulness in his or her accomplishments.	In looking back on his or her life, the older adult experiences regret, dissatisfaction, and disappointment about his or her life and accomplishments.

SOURCE: Adapted from Erikson (1964a).

ACTIVITY 18.2 - KOHLBERG'S LEVELS

Instructions: Read the following moral dilemma. Notice that several rationales for answering the dilemma are presented on the next page. Try to decide which level of Kohlberg's Theory of Moral Development is represented by each rationale. Each moral level is represented twice - one for a "yes" answer and one for a "no" answer.

Rick is a new student in college. He is the first one in his family ever to have the privilege to go. He is very poor and can hardly pay his tuition and living expenses. Rick must take Biology, but he went to the book store and found out that the book costs \$200.00. The bookstore owner is an old man who probably makes a decent living because he has the only book store in town. He talks to the bookstore owner so that he can possibly go on a payment plan. The bookstore owner refuses, and says that he better find a way to pay for the book. Rick talks to his professor, and the professor says Rick really does need to find a way to pay for the book. The next day Rick goes to the bookstore and no one is around. He is really tempted to steal the book. Should he do it? Why or why not?

Use this outline of Kohlberg's levels to help you decide which rationales belong with which level.

Level One: Preconventional Level. No internalization of moral values. Moral reasoning based on external rewards and punishments - "looking out for the self."

-Obey to avoid punishment.

-Obey when it's in one's best interest - I'll do you a favor if you do me a favor.

Level Two: Conventional Level: Intermediate internalization of moral values. Moral reasoning based on own (internal) and others' (external) standards, especially laws and norms

-Obey to be a "good" person in others' minds - accepted.

-Obey because of social order, laws, duty.

Level Three: Postconventional Level - Internalization of moral values. Moral reasoning based on own standards - needs at least Formal Operations.

-Obey laws if perceived as not harming individual rights.

-Obey "universal human laws" that go beyond laws of any society.

RESPONSE 18.2 - KOHLBERG'S LEVELS - HANDOUT

The following answers to Rick's dilemma represent which LEVELS (One, Two, Three) of Kohlberg's Stages of Moral Development?

Should Rick steal the book?

1. _____ No: He violated social laws (stealing is illegal) that are there for our protection.
2. _____ No: In stealing, he violated the fundamental human rights of the other bookstore owner. The bookstore owner has the right not to be robbed and to feel safe.
3. _____ No: He will be punished if he steals the book.
4. _____ Yes: In that circumstance, Rick's wanting to make something of himself outweighs the law.
5. _____ Yes: He needs his book - the bookstore owner's rights are not important.
6. _____ Yes: He may break law, but he did offer the bookstore owner what he could so other people will understand why Rick stole the book.